

IN THE CLAIMS

1. (currently amended) A transmission device, comprising:
 - a receiving unit operable to receive a digital signal distributed from a prescribed distribution device;
 - a first generating unit operable to set identification information corresponding to a reception device and reception control information for controlling the reception operation of the reception device in an area secured in advance in a format of composite information, thereby generating composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed;
 - a second generating unit operable to compose a predetermined number of digital signals based on the composite information to generate redistribution digital signals containing the composite information; and
 - a transmitter operable to transmit the redistribution digital signals to the reception device,
- the redistribution digital signals being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signals includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

2. (previously presented) The transmission device as claimed in claim 1, wherein the reception control information is set to control the reception operation for every digital signal for redistribution in the reception device.

3. (previously presented) The transmission device as claimed in claim 1, wherein the first generating unit generates the composite information every time a digital signal for redistribution is received by the reception device so that the composite information is achieved by the reception device when the composite information is renewed.

4. (previously presented) The transmission device as claimed in claim 3, wherein the renewal of the composite information is recognized based on the version information of the composite information.

5. (currently amended) A transmission method, comprising:
receiving a digital signal distributed from a prescribed distribution device;

setting identification information corresponding to a reception device and reception control information for controlling the reception operation of the reception device in

an area secured in advance in a format of composite information, thereby generating composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed;

composing a predetermined number of digital signals based on the composite information to generate redistribution digital signals containing the composite information; and

transmitting the redistribution digital signals to the reception device,

the redistribution digital signals being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signals includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet

corresponding to the transport packets associated with the frame transport packet.

6. (currently amended) A non-transitory computer-readable recording medium having recorded thereon a computer program for carrying out a transmission method, the method comprising:

receiving a digital signal distributed from a prescribed distribution device;

setting identification information corresponding to a reception device and reception control information for controlling the reception operation of the reception device in an area secured in advance in a format of composite information, thereby generating composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed;

composing a predetermined number of digital signals based on the composite information to generate redistribution digital signals containing the composite information; and

transmitting the redistribution digital signals to the reception device,

the redistribution digital signals being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signals includes writing information identifying the reception

device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

7. (currently amended) A system, comprising:

a processor that executes instructions for carrying out a method of performing a transmission process, the method including:

receiving a digital signal distributed from a prescribed distribution device,

setting identification information corresponding to a reception device and reception control information for controlling the reception operation of the reception device in an area secured in advance in a format of composite information, thereby generating composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed,

composing a predetermined number of digital signals based on the composite information to generate redistribution digital signals containing the composite information, and

transmitting the redistribution digital signals to the reception device,

the redistribution digital signals being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signals includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

8. (currently amended) A reception device, comprising:

a storage unit operable to store identification information corresponding to the reception device;

a receiver operable to receive a redistribution digital signal containing composite information transmitted from a transmission device;

an achieving unit operable to achieve reception control information corresponding to the identification information stored in the storage unit from an area secured in advance in a format of the composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed;

an extracting unit operable to extract a desired digital signal from the redistribution digital signal using the composite information; and

a processor operable to process the desired digital signal based on the reception control information,

the redistribution digital signal being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signal includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

9. (previously presented) The reception device as claimed in claim 8, wherein the achieving unit achieves the reception control information every time that the redistribution digital signal is received by the receiver or the composite information is renewed.

10. (previously presented) The reception device as claimed in claim 9, wherein the renewal of the composite information is recognized based on the version information of the composite information.

11. (previously presented) The reception device as claimed in claim 8, wherein the achieving unit achieves the reception control information separately from the reception of the redistribution digital signal in the receiver.

12. (currently amended) A reception method, comprising:

storing identification information corresponding to a reception device;

receiving a redistribution digital signal containing composite information transmitted from a transmission device;

achieving reception control information corresponding to the stored identification information from an area secured in advance in a format of the composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version

number of the reception control information having a value that is incremented each time the reception control information is renewed;

extracting a desired digital signal from the redistribution digital signal using the composite information; and

processing the desired digital signal based on the reception control information,

the redistribution digital signal being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signal includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

13. (currently amended) A non-transitory computer-readable medium having recorded thereon a computer program for carrying out a reception method, the method comprising:

storing identification information corresponding to a reception device;

receiving a redistribution digital signal containing composite information transmitted from a transmission device;

achieving reception control information corresponding to the stored identification information from an area secured in advance in a format of the composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed;

extracting a desired digital signal from the redistribution digital signal using the composite information; and

processing the desired digital signal based on the reception control information,

the redistribution digital signal being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signal includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

14. (currently amended) A system, comprising:

a processor that executes instructions for carrying out a method of performing a reception process, the method including:

storing identification information corresponding to a reception device,

receiving a redistribution digital signal containing composite information transmitted from a transmission device,

achieving reception control information corresponding to the stored identification information from an area secured in advance in a format of the composite information, the composite information including (i) a version number of the composite information having a value that is incremented each time the composite information is renewed and (ii) a version number of the reception control information having a value that is incremented each time the reception control information is renewed,

extracting a desired digital signal from the redistribution digital signal using the composite information, and

processing the desired digital signal based on the reception control information,

the redistribution digital signal being formed based on packets of the received digital signal and frame transport packets which are not part of the received digital signal, the frame transport packets including a predefined area in which data can be written, and the formation of the redistribution signal includes writing information identifying the reception device in the predefined area and writing reception control information for the reception device in the predefined area,

the writing of information identifying the reception device and the writing of reception control information for the reception device being performed on a frame-by-frame basis,

each frame transport packet being associated with a plurality of transport packets having the same format as the packets of the received digital signal, and the reception control information written in the frame transport packet corresponding to the transport packets associated with the frame transport packet.

15. (previously presented) The transmission device as claimed in claim 3, wherein the renewal of the composite information is recognized based on the version information of the reception control information.

16. (previously presented) The reception device as claimed in claim 9, wherein the renewal of the composite information is recognized based on the version information of the reception control information.